PRESENTATIONS

Transportation Operations:

Dr. Christine Johnson, *Program Manager, Operations Core Business Unit, Department of Transportation, Federal Highway Administration*

Synopsis: Why now? The mission of the FHWA has shifted from the construction of the Interstate Highway System to one of operating the system. The economy demands a higher level of certainty in the operation of the highway system and new technologies provide the opportunity to improve the system. Margins of profitability require better use of weather and other transportation information to improve the capacity of the system and to make it more predictable and reliable. Communications and the information industry provide tools to better manage resources and the variables affecting the system to help optimize the system. Information must be tailored to decisions. This process includes filtering, fusion, and options review, with weather information providing probably the highest payoff.

Website: www.fhwa.dot.gov

ITS Architecture & Outcome Measures:

Mr. Bruce Eisenhart & Dr. Joseph Peters, *Department of Transportation-ITS-JPO*

Synopsis: The National ITS architecture provides the framework for a needs-based process leading to system requirements. Just as an architect plans lay out the design of a house, the National ITS Architecture provides a master blueprint for building an integrated, multi-modal, intelligent transportation system. It defines the framework around which a generally common ITS infrastructure can be developed, while ensuring that local needs are met. This framework will help state and local decision-makers plan smarter and buy smarter, ultimately, saving time and money in the future while making their regions more economically attractive. Dr. Peters described evaluation aspects of the transportation system. He noted that 17 percent of traffic fatalities were due to weather and that 60 percent of these occurred in rural areas. Dr. Peters also stated there is a need to develop a benefits/cost database for transportation systems.

Website: www.fhwa.dot.gov
Slides: *National ITS Architecture, Intelligent Transportation Systems: Evaluation and Assessment*, Appendix B, (See OFCM website www.ofcm.gov).

Weather-Related Transportation Accidents:

Dr. H. Keith Brewer, Director, *Office of Human Centered Research, National Highway Traffic Safety Administration*

Synopsis: Dr. Brewer noted that there is an average of 20 major pileups per year due to weather. During the period 1989-98, adverse weather caused 28 percent of the crashes, 25 percent of those injured, and 19 percent of the fatalities. The economic cost of accidents is $42 billion per year, which are about 30 percent of the overall cost of accidents.

Website: www.nhtsa.dot.gov
Slides: *Overview of U.S. Crashes & Weather Environment*, Appendix B, (See OFCM website www.ofcm.gov).

Transportation Weather-Related Issues:

Dr. Ronald McPherson, Executive Director, *American Meteorological Society*

Synopsis: Dr. McPherson focused his presentation on weather information issues and coordination and cooperation issues. Weather information issues include the credibility of weather advisories, hazardous versus non-hazardous adverse weather, information assimilation and communications, and the evaluation of weather information effectiveness (verification). Coordination and cooperation issues include those among communities of ITS, public and commercial concerns, and the weather providers and operational decision-makers.

Website: www.ametsoc.org/AMS/